



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
[www.uspto.gov](http://www.uspto.gov)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/719,755	11/21/2003	Andrea Demetrius Bowens-Jones	9447	3138
27752	7590	07/12/2007	EXAMINER	
THE PROCTER & GAMBLE COMPANY			CLAYTOR, DEIRDRE RENEE	
INTELLECTUAL PROPERTY DIVISION - WEST BLDG.				
WINTON HILL BUSINESS CENTER - BOX 412				
6250 CENTER HILL AVENUE			ART UNIT	PAPER NUMBER
CINCINNATI, OH 45224			1617	
MAIL DATE		DELIVERY MODE		
07/12/2007		PAPER		

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.



UNITED STATES PATENT AND TRADEMARK OFFICE

---

Commissioner for Patents  
United States Patent and Trademark Office  
P.O. Box 1450  
Alexandria, VA 22313-1450  
[www.uspto.gov](http://www.uspto.gov)

**BEFORE THE BOARD OF PATENT APPEALS  
AND INTERFERENCES**

Application Number: 10/719,755  
Filing Date: November 21, 2003  
Appellant(s): BOWENS-JONES ET AL.

**MAILED**  
**JUL 12 2007**  
**GROUP 1600**

---

Andrew J. Hagerty  
Registration No. 44,143  
For Appellant

**EXAMINER'S ANSWER**

This is in response to the appeal brief filed 4/13/2007 appealing from the Office action mailed 3/13/2007.

Art Unit: 1617

**(1) Real Party in Interest**

A statement identifying by name the real party in interest is contained in the brief.

**(2) Related Appeals and Interferences**

The examiner is not aware of any related appeals, interferences, or judicial proceedings which will directly affect or be directly affected by or have a bearing on the Board's decision in the pending appeal.

**(3) Status of Claims**

The statement of the status of claims contained in the brief is correct.

**(4) Status of Amendments After Final**

The appellant's statement of the status of amendments after final rejection contained in the brief is correct.

**(5) Summary of Claimed Subject Matter**

The summary of claimed subject matter contained in the brief is correct.

**(6) Grounds of Rejection to be Reviewed on Appeal**

The appellant's statement of the grounds of rejection to be reviewed on appeal is correct.

**(7) Claims Appendix**

The copy of the appealed claims contained in the Appendix to the brief is correct.

**(8) Evidence Relied Upon**

6,274,127	Schraer	8-2001
6,149,897	Swaile	11-2000

**(9) Grounds of Rejection**

The following ground(s) of rejections are applicable to the appealed claims:

**Claim Rejections – 35 USC § 103**

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-16 rejected under 35 U.S.C. 103(a) as being unpatentable over Schraer et al. (U.S. Patent 6,274,127 B1) in view of Swaile (U.S. Patent 6,149,897).

Schraer et al. teach an anhydrous antiperspirant composition comprised of water-reactive monomers (Col. 2, lines 46-49). The water-reactive monomers include cyanoacrylate esters, at a concentration of 0.1-60% (meeting the limitations of claims 1-5; Col. 3, lines 64-67 – Col. 4, lines 1-43). The composition also contains skin-adhering polymers such as copolymers of acrylates and silicone copolyols and silicone elastomers (also meeting the limitation of claims 1, 3-5; Col. 9, lines 41-45, Table 1).

The composition contains an anhydrous carrier, such as a cyclic silicone, in a concentration from about 1% to 99% (meeting the limitation of claims 1, 2, and 13; Col. 4, lines 49-54; Col. 5, lines 17-24 and 40-43). The antiperspirant composition also contains deodorant actives, which are antimicrobial agents (meeting the limitations of claims 15-16, Col. 6, lines 63-66). Antiperspirant actives in the composition include aluminum and zirconium salts in a concentration from about 0.1% to 30% (meeting the limitation of claims 1, 2, and 11; Col. 8, lines 19-22, lines 29-38). The composition also

Art Unit: 1617

contains thickening agents such as organic solids, silicone solids, and gellants, in a concentration from about 0.1% to about 35% (meeting the limitation of claims 1, 2, and 12; Col. 9, lines 22-27). The ratio of the polymer is proportional to the weight of the thickening agent as shown in Table 1 (weights shown as percentages of the total composition; meeting the limitation of claim 8).

Schraer et al. does not teach a volatile solvent.

Swaile teaches an anhydrous antiperspirant composition where a possible anhydrous solvent is ethanol (further meeting the limitation of claims 1, 9 and 10; Col. 4, lines 57-63 and Claim 5).

Furthermore, it is obvious to vary and/or optimize the concentration of the volatile solvent, and the glass transition temperature of the skin-adhering polymer provided in the composition, according to the guidance provided by Schraer et al., to provide a composition having the desired properties such as the desired concentration of the volatile solvent and the desired glass transition temperature of the skin-adhering polymer to effectively adhere to the skin. It is noted that “[W]here the general conditions of a claim are disclosed in the prior art, it is not inventive to discover the optimum or workable ranges by routine experimentation.” In re Aller, 220 F.2d 454, 456, 105 USPQ 233, 235 (CCPA 1955).

Furthermore, it is obvious that the skin-adhering polymer will have the same properties, such as film-formation at or above the entanglement molecular weight of the polymer used. Because the skin-adhering polymer of the prior art and the skin-adhering

Art Unit: 1617

polymer of the instant application are the same, they will share the same physical properties.

Accordingly, it would have been obvious to one having ordinary skill in the art at the time the invention was made to combine the teachings of Schraer et al. who teach an anhydrous antiperspirant composition comprised of a skin-adhering polymer, an anti-perspirant active, a thickening agent, and an anhydrous carrier, with the teachings of Swaile which also teach an anhydrous antiperspirant composition with ethanol as a volatile solvent. One having ordinary skill in the art at the time the invention was made would have been motivated to combine the ingredients of Schraer et al. and add ethanol from the teachings of Swaile to provide improved dry feel application, antiperspirant efficacy and stability of the dissolved active.

#### **(10) Response to Argument**

Appellants point out that the water-reactive monomers disclosed by Schraer et al. are used to meet the skin-adhering polymer feature recited in the claims. Appellant argues that the water-reactive monomers taught by Schraer et al. are not intended to polymerize into a polymer film until activated by sweat or water in comparison to their invention in which the skin adhering polymer adheres to the skin before sweat or water. This argument is not found persuasive because, as taught by Schraer et al., the water-reactive monomers form discontinuous polymer-containing films on the skin and act as plugs within the ducts to help prevent perspiration (Col. 2, lines 17-23). The language of the instant claims as written are drawn to an anhydrous, antiperspirant composition that is comprised of skin-adhering polymers and are not drawn to whether the

Art Unit: 1617

monomers polymerize during or after sweat or water. However, in further response to this argument, Schraer et al. teach that the water-reactive monomers of the invention may react with water or sweat to polymerize or react and polymerize during or after application to the underarm (Col. 3, lines 17-22). Therefore, the water-reactive monomers meet the skin-adhering polymer of the instant claims because the water-reactive monomers polymerize on the skin and according to Schraer et al. may polymerize during or after application to the underarm. Appellants further argue that the composition of Schraer et al. could rub off or transfer to clothing prior to a sweat event; however, as stated before the instant claims are drawn to antiperspirant compositions and the various ingredients contained in the composition and not to when the skin-adhering polymer polymerize on the skin or the rub off characteristics of the composition.

Appellants further argue that if the Schraer et al. composition comprises a skin-adhering polymer when applied to the skin, that any employed volatile solvent would be evaporated. This argument is not found persuasive because Swaile teaches anhydrous antiperspirant compositions that contain a volatile solvent (termed an anhydrous solvent; Col. 1, lines 17-38). Swaile teaches that antiperspirant actives are suspended in an alcoholic solvent and that once solubilized the antiperspirant active can provide improved dry feel application, antiperspirant efficacy and stability of the dissolved active. Therefore, Swaile teaches that volatile solvents are useful in anhydrous antiperspirant compositions.

Art Unit: 1617

Appellants further argue that the non-final Office Action relied upon an optional thickening agent to read on skin-adhering polymer and a separate thickening agent. Appellant states that there is no disclosure of a composition having a skin adhering polymer and a separate thickening agent. This argument is not found persuasive because Table 1 exemplifies an antiperspirant composition comprised of water-reactive monomers (meeting the limitation of skin-adhering polymer) in addition to thickening or suspending agents such as C18-36 acid triglycerides. Therefore, compositions comprising both a polymer that adheres to the skin and a thickening agent are taught by Schraer et al.

**(11) Related Proceeding(s) Appendix**

No decision rendered by a court or the Board is identified by the examiner in the Related Appeals and Interferences section of this examiner's answer.

For the above reasons, it is believed that the rejections should be sustained.

Respectfully submitted,

Sreeni Padmanabhan



Supervisory Patent Examiner

AU 1617

Conferees:

Johann Richter



Application/Control Number: 10/719,755

Art Unit: 1617

Page 8

Renee Claytor *Reneé Claytor*